

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization
International Bureau



(43) International Publication Date
26 May 2005 (26.05.2005)

PCT

(10) International Publication Number:
WO 2005/047010 A1

BEST AVAILABLE COPY

(51) International Patent Classification⁷: **B41M 5/38, 5/40**

(21) International Application Number: **PCT/EP2004/011583**

(22) International Filing Date: **15 October 2004 (15.10.2004)**

(25) Filing Language: **German**

(26) Publication Language: **German**

(30) Priority Data:
103 52 857.1 10 November 2003 (10.11.2003) DE
10 2004 026 336.1 26 May 2004 (26.05.2004) DE

(71) Applicant (for all designated States except US): **MERCK PATENT GMBH [DE/DE]**; Frankfurter Strasse 250, 64293 Darmstadt (DE).

(72) Inventors; and

(75) Inventors/Applicants (for US only): **STOCKUM, Werner [DE/DE]**; Waldstrasse 59, 64354 Reinheim (DE). **KLEIN, Sylke [DE/DE]**; Am Hühnerbusch 17, 64380 Rossdorf (DE).

(74) Common Representative: **MERCK PATENT GMBH**; Frankfurter Strasse 250, 64293 Darmstadt (DE).

(81) Designated states (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated states (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

— with international search report

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: COLOURED LASER MARKING

(57) Abstract: The invention relates to the coloured laser marking and laser inscription of plastics based on welding of a polymer-containing inscription medium to the plastic surface.